

REMARKS

Please replace the abstract on page 44 of the present application, with the amended abstract on the separate sheet attached.

Applicant has also attached a copy of an Information Disclosure including a substitute Form 1449A with four cited patent references, which was submitted under 37 CFR §1.97(b) on May 7, 2003. Applicant has noticed that the application serial number on the Information Disclosure Statement submitted on May 7, 2003 was incorrect and did not match the correct application serial number on the substitute Form 1449A. In the event that the four cited references may not have been considered in the present application, Applicant has attached another copy of the substitute Form 1449A and respectfully requests the Examiner initial the references if they have been considered.

The foregoing amendment is correct minor informalities and to provide claims consistent with the restriction requirement under 35 USC 121, rather than to avoid prior art.

Applicant respectfully requests reconsideration of the above identified application. Claims 1-30 are pending. Claims 10, 20 and 30 are amended. Claims 16-19 and 25-28 are cancelled. Claims 31-38 are added.

The remaining comments are directed to the restriction requirement under 35 USC 121 and to the added Claims 31-38. Applicant respectfully notes that in the Office communication mailed on April 28, 2004, interpretations or characterizations by the Examiner include inferences and/or potential limitations, to which Applicant does not wholly agree. Therefore, Applicant reserves future rights to dispute any portion or all of said interpretations or characterizations.

**RESPONSE TO REQUIREMENT FOR RESTRICTION**

In the Office communication mailed April 28, 2004, a requirement for restriction under 35 USC 121 was made.

Accordingly, Applicant respectfully acknowledges the requirement for restriction and indicates an election of the following group of claims to be examined for the referenced application:

The group, I, as claimed in Claims 1-15, 20-24, 29-30 and also in the added Claims 31-38.

Applicant believes that added Claims 31-38 are consistent with the elected group, I, and are also patentable. The addition of Claims 31-38 together with the cancellation of Claims 16-19 and 25-28 results in no net change in the number of claims presented for examination.

Applicant, therefore, believes that Claims 1-15, 20-24, 29-30 and 31-38 are presently in condition for allowance and such action is earnestly solicited.

**CONCLUSION**

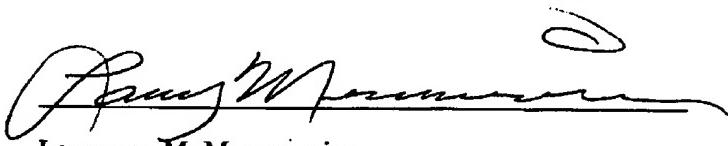
Applicant respectfully submits the present claims for allowance. If the Examiner believes a telephone conference would expedite or assist in the allowance of the present application, the Examiner is invited to call Lawrence M. Mennemeier at (408) 765-2194.

Authorization is hereby given to charge our Deposit Account No. 02-2666 for any charges that may be due.

Respectfully submitted,

BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN

Date: 5-27-2004



Lawrence M. Mennemeier

Reg. No. 51,003

12400 Wilshire Boulevard

Seventh Floor

Los Angeles, CA 90025-1026

(408) 720-8300

Attachments:

Amended Abstract of the Disclosure

Copy of Information Disclosure submitted May 7, 2003 (3 pages)

Application No. 09/608,856

Jin Yang

Filed 6/30/2000

**ABSTRACT OF THE DISCLOSURE**

Methods for formal verification of circuits and other finite-state systems are disclosed including definitions and semantics for models of finite-state systems, assertion graphs to express properties for verification, and satisfiability criteria for automated verification of forward implication properties and backward justification properties. Methods are disclosed to compute simulation relation sequences, which can be compared to consequence labels of assertion graphs to verify implication properties. Alternative methods perform antecedent strengthening on antecedent labels of assertion graphs and compute simulation relation sequences from the strengthened antecedent labels, thereby permitting automated formal verification of justification properties. Finally methods are disclosed to significantly reduce computation through the abstraction of models and assertion graphs and the computing of implicit satisfiability of assertion graphs from simulation relations computed for the abstractions.